

ABSTRACT OF THE DISCLOSURE

An electrostatic discharge protection circuit that includes a rectifier, having an anode and a cathode, including a first p-type portion, a first n-type portion contiguous with the first p-type portion, a second p-type portion contiguous with the first n-type portion, and a second n-type portion contiguous with the second p-type portion, wherein the first p-type portion is coupled to the anode and the second n-type portion is coupled to the cathode, a first transistor having a first terminal, a second terminal and a gate terminal, wherein the first terminal is coupled to the first n-type portion of the rectifier, a second transistor having a first terminal, a second terminal and a gate terminal, wherein the first terminal is coupled to the second terminal of the first transistor, and the second terminal is coupled to the second n-type portion of the rectifier, and a voltage coupling circuit having a first terminal, a second terminal, a third terminal, and a fourth terminal, wherein the first terminal is coupled to the anode of the rectifier, the second and the third terminals are respectively coupled to the gate terminals of the first and second transistors, and the fourth terminal is coupled to the cathode.